

## **LISTING OF THE CLAIMS**

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Currently Amended) A method for determining a vehicle speed, comprising the steps of:

determining at least one of ~~[[if]]~~ whether at least one driven wheel of the vehicle is spinning or shows a tendency to spin and ~~[[if]]~~ whether the vehicle is being braked under influence of an antilock braking system, and

determining the vehicle speed based on at least one of a rate of rotation of at least one non-driven wheel of the vehicle, ~~a value of the vehicle speed received from a positioning system and a value of the vehicle speed received from a vehicle radar system, or based on a mean value of at least two of the rate of rotation of the at least one non-driven wheel of the vehicle, a value of the vehicle speed received from a positioning system and the value of the vehicle speed received from a vehicle radar system~~ in the event that either the at least one driven wheel is spinning or shows a tendency to spin or the vehicle is being braked under influence of the antilock braking system.

2. (Previously Presented) A method according to claim 1, comprising the further step of: calculating the vehicle speed based on at least one of an engine speed of the vehicle, a propeller shaft speed of the vehicle and a crank shaft speed of the vehicle, if the at least one driven wheel is not spinning or shows a tendency to spin or the vehicle is not being braked under the influence of the antilock braking system.

3. (Currently Amended) An automatic gear shifting system for a vehicle wherein the vehicle includes wheels including one driven wheel, and at least one of an antilock braking system operable on the wheels, a positioning system unit, a vehicle radar system and a traction control system;

the shifting system comprising a determining system for determining at least one of, ~~[[if]]~~ whether at least one driven wheel is spinning or shows a tendency to spin and whether the antilock braking system of the vehicle is operating, and the determining system comprising:

a calculator operable for calculating a vehicle speed based on at least one of a rate of rotation of at least one ~~of the~~ non-driven wheel of the vehicle, the positioning system unit in the vehicle and the vehicle radar system, and

the determining [[a]] system being operable for determining the vehicle speed based on at least one of [[a]] the rate of the rotation of the at least one non-driven wheel, ~~a value of the vehicle speed received from the positioning system unit~~ and a value of the vehicle speed received from the vehicle radar system, or based on a mean value of at least two of the rate of the rotation of the at least one non-driven wheel, a value of the vehicle speed received from the positioning system and the value of the vehicle speed received from the vehicle radar system and the determining system being operable if either the at least one driven wheel is spinning or shows a tendency to spin or the vehicle is braked under influence of the antilock braking system.

4. (Previously Presented) A system according to claim 3, wherein the vehicle further comprises an engine for driving the driven wheel, a propeller shaft and a crank shaft, the system comprising

the calculator being further operable for calculating the vehicle speed based on at least one of an engine speed of the vehicle and a propeller shaft speed, if the at least one driven wheel is not spinning or shows a tendency to spin or the vehicle is not braked under the influence of the antilock braking system.

5. (Currently Amended) A computer program for determining a vehicle speed, the computer program being embodied on a computer-readable medium, comprising computer readable code means, which when run on an electronic control unit in a vehicle, causes the electronic control unit to

determine at least one of [[if]] whether at least one driven wheel of the vehicle is spinning or shows a tendency to spin and [[if]] whether the vehicle is being braked under influence of an antilock braking system, and

determine the vehicle speed based on at least one of a rate of rotation of at least one non-driven wheel of the vehicle, ~~a value of the vehicle speed received from a positioning system~~ and a value of the vehicle speed received from a vehicle radar system, or based on a mean value

of at least two of the rate of rotation of the at least one non-driven wheel of the vehicle, a value of the vehicle speed received from a positioning system and the value of the vehicle speed received from the vehicle radar system if either the at least one driven wheel [[[6)]] is spinning or shows a tendency to spin or the vehicle is being braked under influence of the antilock braking system.

6. (Original) A computer program product comprising a computer readable medium and a computer program according to claim 5 stored on the computer readable medium.

7. (Previously Presented) An electronic control unit adapted for connection to a vehicle internal network bus in a vehicle, the control unit comprising a storing means and a computer program according to claim 5 stored on the storing means.

8. (Previously Presented) An electronic control unit according to claim 7, wherein the electronic control unit is a gearbox electronic control unit.